

REMARKS/ARGUMENTS

Favorable reconsideration of this application, in light of the present amendments and following discussion, is respectfully requested.

Claims 18-36 are pending. Claims 33-36 are newly added. Claims 29-32 are withdrawn. Claim 18 is amended. Support for the amendment to Claim 18 can be found in the published application in numbered paragraph [0065], for example. Support for newly added Claim 33 can be found in numbered paragraph [0043] of the published application, for example. Support for newly added dependent Claim 34 can be found in numbered paragraph [0102], for example. Support for newly added dependent Claim 35 can be found in numbered paragraph [0065], for example. Support for newly added dependent Claim 36 can be found in the published application in numbered paragraph [0091], for example. No new matter is added.

In the outstanding Office Action, Claims 18-28 were rejected under 35 U.S.C. § 112, second paragraph, as indefinite. Claims 18-28 were rejected on the ground of nonstatutory obviousness-type double patenting as unpatentable over Claims 1 and 6 of U.S. Patent No. 7,322,756. Claims 18-27 were rejected under 35 U.S.C. § 103(a) as obvious over Takekuma (U.S. Patent No. 6,377,329) in view of Okubo et al. (U.S. Patent No. 6,851,872, herein "Okubo"). Claim 28 was rejected under 35 U.S.C. § 103(a) as obvious over Takekuma in view of Okubo and Yoshioka (U.S. Patent No. 6,168,667).

At the outset, Applicants note with appreciation the courtesy of a personal interview granted by Primary Examiner Yewebdar Tadesse to Applicants' representative on December 8, 2009. In combination with the Interview Summary provided by Primary Examiner Tadesse, the substance of the personal interview is substantially summarized below in accordance with MPEP § 713.04.

Regarding the rejection of Claims 18-28 as indefinite, each of Claims 18, 22, and 24 is amended in accordance with input provided by Primary Examiner Tadesse during the personal interview. Accordingly, Applicants respectfully submit that the rejection of Claims 18-28 as indefinite is overcome.

Regarding the rejection of Claims 18-28 on the ground of nonstatutory obviousness-type double patenting as unpatentable over Claims 1 and 6 of U.S. Patent No. 7,322,756, that rejection is respectfully traversed by the present response.

Amended independent Claim 18 recites, in part:

a controller programmed to determine a process block where there is no substrate or where a final step for the last substrate within the relevant process block will be finished earliest based on the processing information of the substrates from the process block control portions before the substrate is delivered from the first delivery stage to the second transfer means, and for controlling the second transfer means to transfer the substrate on said first delivery stage to the relevant process block.

Thus, a controller is programmed to determine a process block where there is no substrate or where a final step for the last substrate within a relevant process block will be finished earliest based on processing information of the substrates from the process block control portions.

As discussed during the personal interview, the functional features recited in the above-noted paragraph from amended independent Claim 18 should be given patentable weight, especially in light of the amendment to recite “a controller programmed to determine ...”.

In contrast, Claims 1 and 6 of U.S. Patent No. 7,322,756 are unrelated to providing a controller programmed to determine a process block where there is no substrate or where a final substrate in the relevant process block will be finished earliest. Rather, U.S. Patent No. 7,322,756 is directed toward detecting abnormalities. Accordingly, Applicants respectfully

submit that Claims 18-28 and new Claims 33-37 patentably distinguish over U.S. Patent No. 7,322,756, as discussed during the personal interview, for at least the reasons discussed above.

Regarding the rejection of Claims 18-27 as obvious over Takekuma in view of Okubo, that rejection is respectfully traversed by the present response.

As noted above, amended independent Claim 18 recites a controller programmed to determine a process block where there is no substrate or where a final step for the last substrate within the relevant process block will be finished earliest based on processing information of the substrates from process block control portions.

As further discussed during the personal interview, the above-noted features recited in amended independent Claim 18 should be given patentable weight. As discussed during the personal interview, no reasonable combination of Takekuma, Okubo, or Yoshioka would include the above-noted feature. As mentioned in the Interview Summary provided by Primary Examiner Tadesse, amended independent Claim 18 patentably distinguishes over the cited references. Accordingly, Applicants respectfully submit that amended independent Claim 18 and the claims depending therefrom are not obvious over any proper combination of Takekuma, Okubo, and Yoshioka for at least the reasons discussed above.

As further discussed during the personal interview, Claim 18 recites a process block including a coating unit for applying a resist solution to the substrate, a developing unit for performing developing processing on the substrate after exposure to light, a heating unit for heating the substrate, the third transfer means for transferring the substrate between the units, and the second delivery stage for performing delivery of the substrate between said second transfer means and said third transfer means, and such application of the resist solution and/or the developing processing after exposure to light being performed on the substrate in units of each process block.

Accordingly, the coating unit, the developing unit and the heating unit are included in **one** process block, which can produce an unexpected effect of an increase in the moving speed of the substrate between each process of coating, developing and heating.

As discussed above, amended independent Claim 18 also recites a device that determines a process block where there is no substrate or where a final step for the last substrate within the relevant process block will be finished earliest based on the processing information of the substrates from the process block control portions before the substrate is delivered from the first delivery stage to the second transfer means. One benefit of this arrangement is that a new substrate can be transferred to the process block immediately after the process is finished in this process block, which allows the substrate to be speedily processed.

As shown in Fig. 5 in Takekuma, process block (100) is just a **coating** block. Takekuma also describes a distinct developing block (300).

In contrast, as recited in Claim 1, in each process block (in one example, process blocks B3, B4, B5), the substrate is transferred by the third transfer means to a coating unit, a developing unit, and heating units located in the front of and rear of these units **within each block**, and thus, a series of processes for the substrate can be completed independently within the respective process blocks.

The second transfer means (61, 71) in Takekuma has only a transferring function intended to move one-way from the coating block to the exposure block or intended to move one-way in return from the developing block to the cassette station. Takekuma, however, fails to disclose the process of selecting the process block determined based on the characteristics of the second transfer means (23).

Okubo fails to disclose that a plurality of process stations are arranged as recited in Claim 1. Furthermore, Okubo discloses no equivalent to the second transfer means of the subject application.

Okubo describes that the time for waiting for transfer other than the substantial process time between two process units (for example, between COL and CT or between COL and WEE) is eliminated to improve the throughput. However, Okubo fails to disclose that it is possible to keep track of whether a series of processes including a coating process, a developing process and heating processes performed therebefore and thereafter have already been completed (no substrate exists), or to keep track of which process block the series of processes are finished earliest in each of the plurality of process blocks corresponding to a characteristic of the subject application.

Claim 18 recites that the process block includes a coating unit, a developing unit, and a heating unit.

In contrast, in column 5, line 29, Yoshioka describes one type of processing unit (including heat treatment units), that is, a processing unit group including a heating unit, but neither discloses nor suggests a process block including a coating unit, a developing unit and a heating unit as recited in Claim 18.

Accordingly, Yoshioka also fails to disclose that a plurality of process blocks are arranged as recited in amended independent Claim 18.

Furthermore, Yoshioka fails to disclose a device that selects the process block determined based on the characteristics of the second transfer means and processing information about the substrates of each process blocks in order to transfer the substrate.

Accordingly, Applicants respectfully submit that no reasonable combination of the cited references would include all the features recited in amended independent Claim 18 or any of the claims depending therefrom.

For the foregoing reasons, it is respectfully submitted that this application is now in condition for allowance. A Notice of Allowance for Claims 18-28 and 33-37 is earnestly solicited.

Should Primary Examiner Tadesse deem that any further action is necessary to place this application in even better form for allowance, she is encouraged to contact Applicants' undersigned representative at the below-listed telephone number.

Respectfully submitted,

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